ABSTRACT

The difficulty in resolve human negligence in utilizing electricity as fails to remember switch off the lamp when user is not around the house or at the moment switch on the electricity before leaving the house is something that will unconsciousness impacting on excess electricity usage. Based on an 2019 statistic report from Perusahaan Listrik Negara (PLN) 103733.43 GWh household electricity is sold. While the electricity power experienced declines in the year before. The emergence of Internet of Things, the writer takes the advantage for minimalize excess electricity usage with developing a website as an interface to control it.

The website is used as an interface so the it can be controlled with many electronic devices, as long both are connected to the internet and there is also search engine app on the device. The abbreviations of S-LUCY is Smart Light Ultimate Control by Website that has two parts there are S-LUCY product and S-LUCY website. The S-LUCY website has a feature for controlling the switch (On/Off) and also the feature for controlling time and repeat days. This website also provide unique ID for every product S-LUCY where the users of S-LUCY website can only controlled from S-LUCY device that if the users half the unique ID. With an uncomplicated website plot is expected can make the users having no difficulty to adapt with the website as a controlled media from S-LUCY product.

Functionality test result S-LUCY website works as expected, obtained usability percentage with an average of 93.33% an old participant agreed that using the website is effective and efficient to control the IoT device, the website is responsive. The utility task obtained from the CPU usage at 22.33% (Task Manager) and 14.233% (Cpanel) and delay result of quality of service from S-LUCY website is 34.2 ms and truth throughput is 8523.448788 bps.

Keywords: Electricity, S-LUCY, Internet of Things, Website